QUICK INSTALLATION GUIDE

(v. 1.1)

<Read carefully before prooceding with the lecture of this manual>

WARNING:	This is a class A product. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.

WARNING:	Adopt necessary measures to run the system in an environment free of electromagnetic disturbs. The system is capable to restore its functionality after a failure due to electromagnetic disturbs if they do not damage or alter the device. This product has been developed and implements following regulations: EN55022 (Class A); EN55024 (B criteria); EN61000; EN60950.

WARNING:	Use only modems supported by this monitoring unit. Dixell S.r.l. can accept no responsibility for possible damage due the usage of not supported modems.

WARNING:	Dixell S.r.l. reserves itself the right to alter this manual without notice. The last version available can be downloaded from the website.

WARNING:	Dixell S.r.l. reserves the right to change the composition of its products, even without notice, ensuring the same and unchanged functionality.

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1. CHECK LIST

Before installing and configuring the XWEB system we recommend checking its package to verify it contains:

- 1 XWEB unit;
- 1 Quick reference manual (Fast installation);
- 1 CDROM containing the Operating manual;
- 1 Power cord for power supply connection;
- 1 PS2 Splitter for mouse and keyboard;
- 2 Mounting brackets;
- 4 Rubber feet and 3 jumpers;
- Detachable screw connectors (1x2 ways+1x3 ways; 1x6 ways);
- 8 Screws, 3,5mm X 6,5mm;

Figure 1

2. INSTALLATION

Do not open XWEB. Its opening makes its warranty invalid. However, to install XWEB you need:

- One blade and one cross screwdrivers
- Mouse PS2
- Keyboard PS2
- Standard VGA screen (no high definition/HDMI)

To install XWEB, please refer to the picture below which represents the back of XWEB. Apply then following procedure:

1. XWEB has grounding receptacle. Verify the implant in which it will be connected to adopt electrical ground protection;
2. Fix XWEB at its operating position. In case of placement on a table insert provided rubber feet. In case of usage on rack, use provided brackets and screws.
3. To connect XWEB to the electrical network use provided power supply cable(1). Power supply cable shall always be easily accessible by an operator. **Do not power the system on.**
4. Connect RS485 network, relays and digital input (3).
5. Connect to telephonic line network and/or to LAN (4).
6. Connect keyboard and mouse with provided cable (5).
7. Connect monitor (5).
8. Connect printer to USB or parallel receptacles.
9. Connect optional external modem (7). Its cable shall be maximum 10 meters long.
10. Power the system on, pressing and releasing button (2).

- *Connect XWEB to the electrical network with provided cord before any servicing operation. This is for personnel and system safeguard.*

- *Operators shall avoid direct passage of electronic devices that can cause electric discharges and damage the device itself;*
- *Power supply voltage shall not differ from the one required. It can seriously damage the system;*
- *Mistaken connections can be dangerous and compromises operators' safety. Moreover they can damage the system and/or other connected instruments.*
- *Adopt one or more external isolator switches to separate devices to power supply network. They shall easily accessible.*
- *Do not use XWEB in environments with inflammable gas.*
- *Do not modify XWEB in any way.*

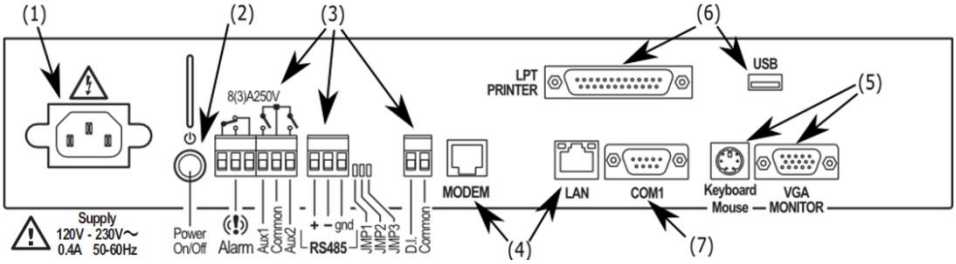


Figure 2

	RS485 NETWORK: always use the indicated polarity; total length shall not exceed 1000m; electric line shall not spit or use star-connections; avoid proximity of electric power sources; usage of shielded cable. Its wires shall be 0.5 mm^2 minimal section. Shield shall not be connected. Belden 8772 cables are reccomended. Connect a terminal line resistor (120 Ohm, 1/4 W) on the most distant device. Resistor shall connect + and – of its serial connector.

Technical details	
Power supply	110 .. 230V ; 0,40A ; 50/60Hz
	60W
Temperature/Humidity	0 .. 40°C 20.. 85 % R.H.
Digital outputs (relays)	2 relays 8A 250V N.O.
	1 relay 8A 250V double touch
Serial ports	1 RS-232 port
	1 RS-485 optoinsuled
USB port	2 standard connection A type ports
Internal modem (if available)	Socket modem, PSTN V.34/33.6K
Electrical safeguard normative	EN60950
Electromagnetc compatibility normative	EN55022; EN55024; EN61000

3. MAINTENANCE

In any case, like maintenance or cleaning or move, XWEB shall not be open. Warranty expires on opening it. Apply following procedure referencing to XWEB rear picture introduced in previous paragraph:

1. At first, press and release power on/off button (2);
2. Wait until all frontal LEDs go off including PWR;
3. Disconnect external modem if present (7);
4. Disconnect printer if present (6);
5. Disconnect monitor, keyboard and mouse (5);
6. Disconnect telephonic and/or LAN cables (4);
7. Disconnect RS-485 terminals, relays and digital input (3);

At last, disconnect power cord (1) and handle on XWEB

	Keeping pressed power button (2) forces instantaneous shutdown. XWEB logs such event but can potentially not operate correctly with other data. Same effects are applied to the cases in which power cord is removed or power supply goes off.

4. RS 485 CONNECTION

The cable must have 2 or 3 wires with shield, minimum section 0,5mm^2 (ex. BELDEN 8772). From the XWEB position the cable reaches all the instrument positions. Do not execute loops or derivations.

Right connection:

Figure 3

Wrong connection:

Figure 4

Always keep the serial cable away from power cables.

Always keep the serial cable away from Electro-magnetic or frequency sources.

Do not connect shield to ground.

Do not connect the "**Gnd (ground)**" terminal.

Remember to draw a map of the line. This will help you to find errors if something is wrong.

The instrument with RS485 have "**+**" and "**-**" terminals, respect the polarity.

To keep the line balanced it is necessary a 100 Ohm resistor at the end of the line (you ca use the RS 485+ and RS 485- terminals of the last instrument connected).

The TTL output

The instrument with RS485 on board does not need any kind of external interface module. For instruments with an external interface: keep the TTL cable away from power cables or frequency sources.

The XJ485 external interface must be connected with a TTL cable to the instrument with TTL compatibility.

Serial address of the instruments

Each instrument must be defined by its unique address.

Check the address into the **Adr** parameter value of each instruments. Take reference to the instruction manual of the instrument itself to find the right procedure to enter the programming and set the value.

The easiest way to work with the category functions is to set the addresses progressively for similar groups of instruments which have the same application.

5. Local connection with monitor, mouse and keyboard

On rear of the XWEB3000 sockets are provided for a monitor, a mouse and a keyboard. Please connect all the peripherals before powering-on the unit otherwise the system may fails to recognise them. This means that , for example, if you do not plug the monitor cable in now, you won't see anything displayed on it later.

The unit can also work without these three elements therefore if the user intends to work just with the remote, he can definitively remove them after the setup operations. In any case inside the of XWEB3000 is loaded a standard browser to allow the user setting up the unit.

If necessary check the instructions manual of each device connected to the unit.

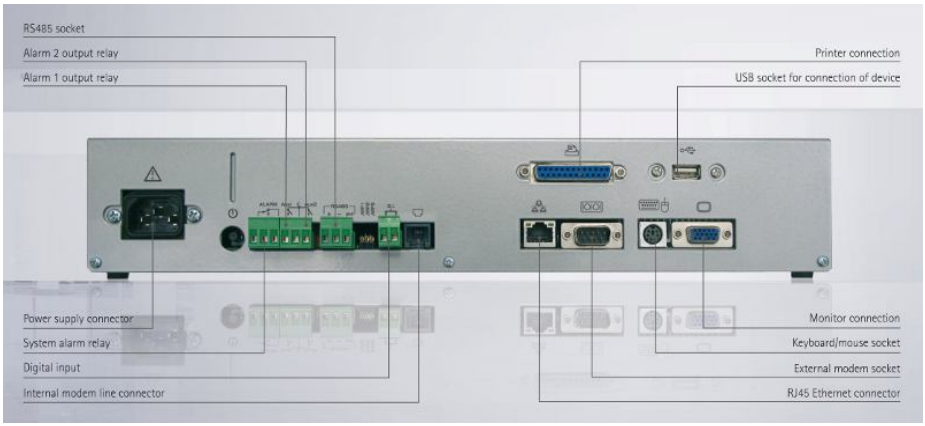


Figure 5

The operative procedure to work with XWEB3000 is the same for all connection methods. It is possible to connect to the unit via a single PC provided with LAN card, by using the net connector RJ 45 (LAN). Due to the PC-client power, this kind of connection is more suitable for the setup procedures.

the cable between the Server and the PC must be with crossing wires ("Bridge Cable"). The connection procedure from the remote PC is described in deep in this guide. You may need some changes to your PC network card, then you will be able to connect to XWEB3000 via Ethernet/ Internet line. Once you have finished setting up your network card, connection to XWEB3000 is established simply by launching the Browser and inserting the default IP number of the unit **http://192.168.0.200** into the address bar.

Before reading on, please take a few moments to write down your PC network setup,

WINDOWS XP TCP/IP SETUP

Click on Start button, chose Control panel, click on “Network and internet connections” icon:

Figure 6

Then chose “Network connections”:

Figure 7

The following windows will appear:

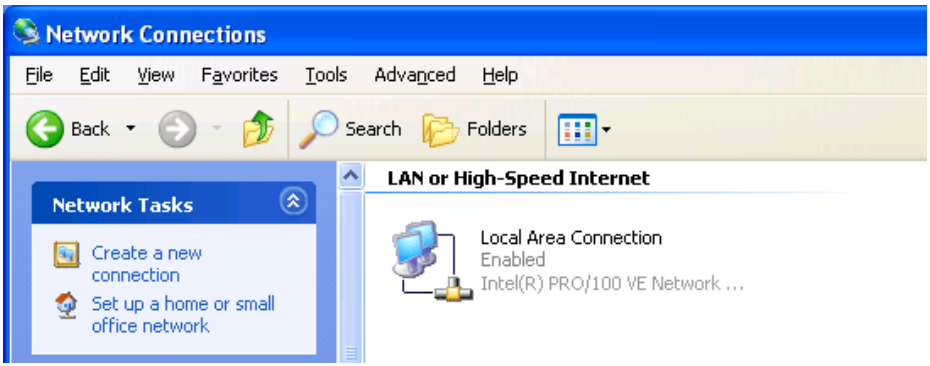


Figure 8

Right mouse click on network interface icon, then chose “Properties”:

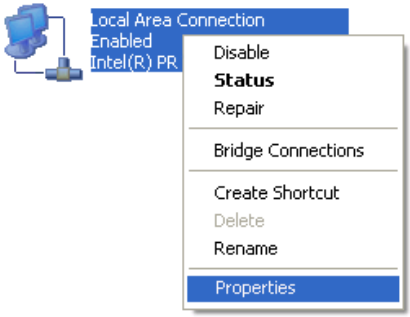


Figure 9

The following windows will appear:

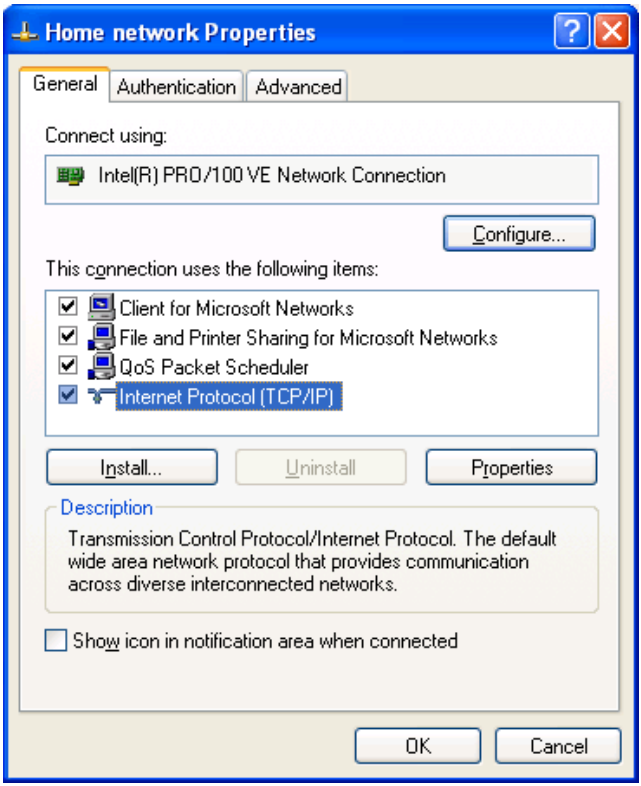


Figure 10

Select “Internet Protocol (TCP/IP)”, then click on Properties. The following windows will appear:

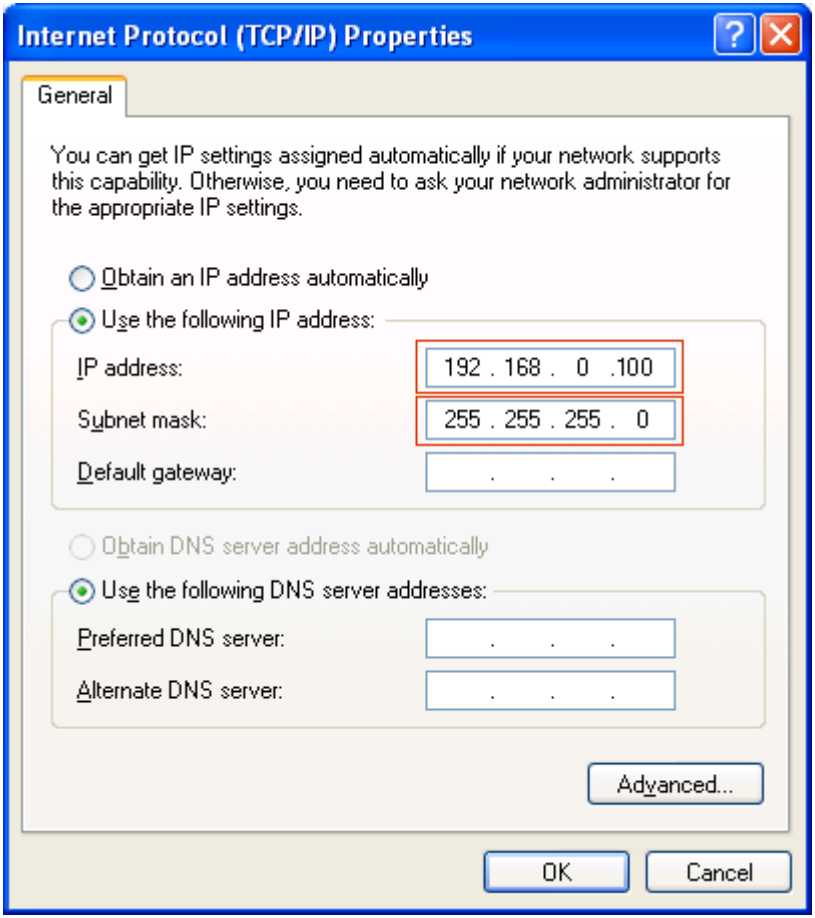


Figure 11

Fill those fields with values indicated in the picture.

Press ‘OK’ to confirm to finish with this procedure.

WINDOWS 7 TCP/IP SETUP

Following procedure is illustrated with Windows7 standard visualization mode. If your system works with a different visualization mode and you have difficulties to follow following instructions then ask for support to an expert operator. Despite the visualization mode the procedure is however the same.

All the following instructions are to be executed with the usage of the left-mouse button only (where red hand icon indicates).

The system may prompt for administrative user-name and password. Please check them before starting the procedure.

Open 'Control Panel' as indicated in Figure 12.

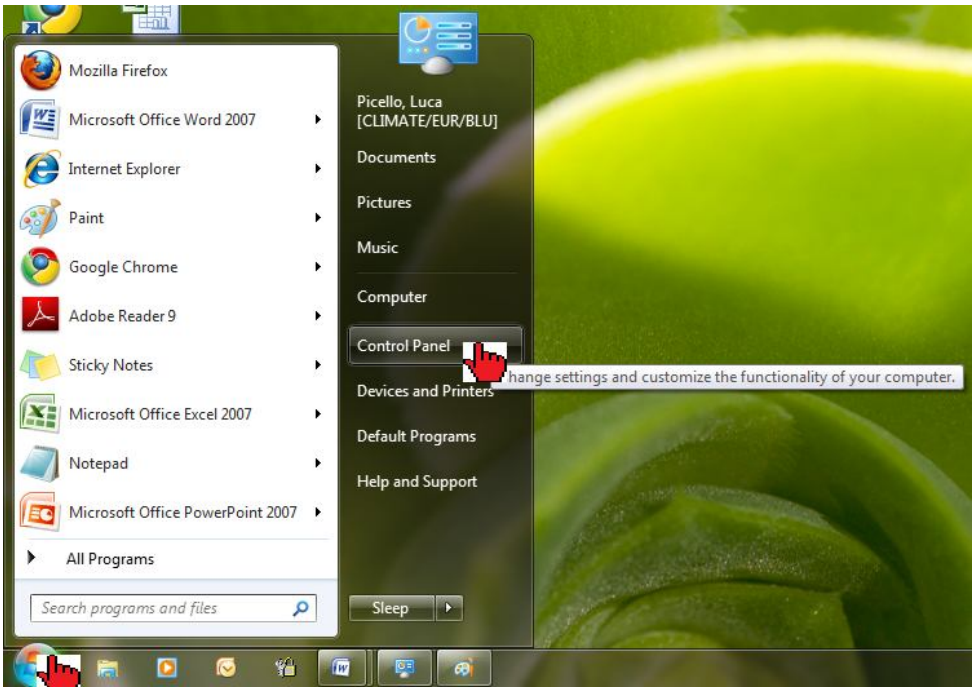


Figure 12

Open ‘Network and Internet’

Figure 13

Open ‘Network and Sharing Center’

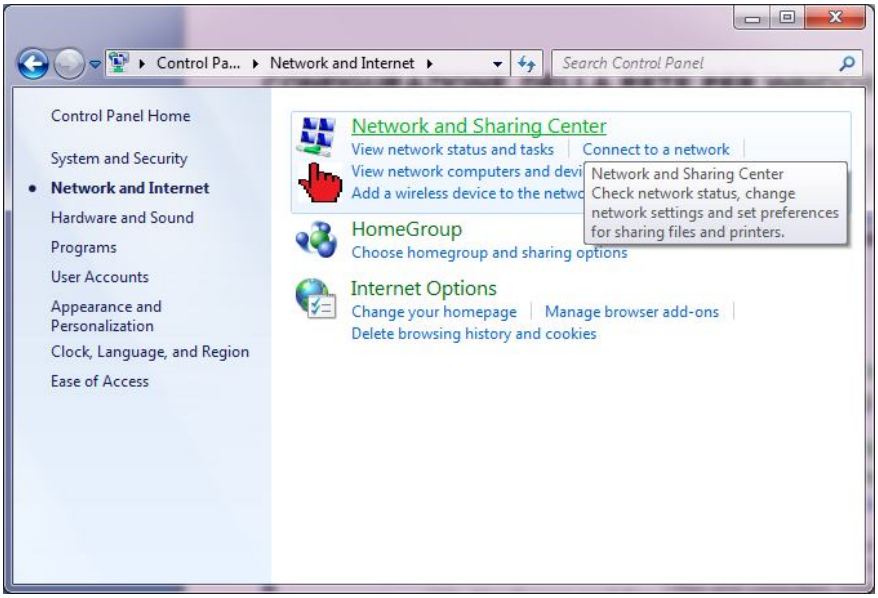


Figure 14

Click on ‘Local Area Connection’

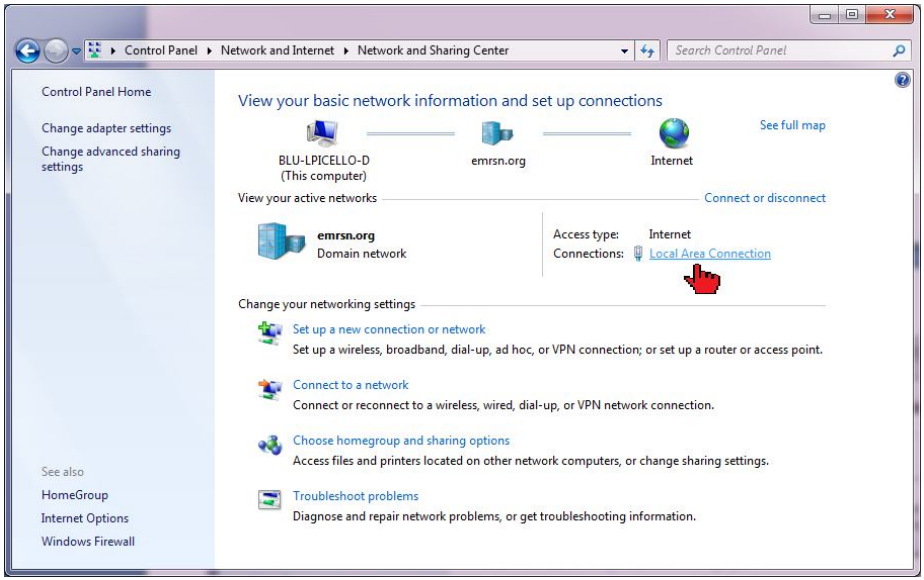


Figure 15

Click on ‘Properties’:

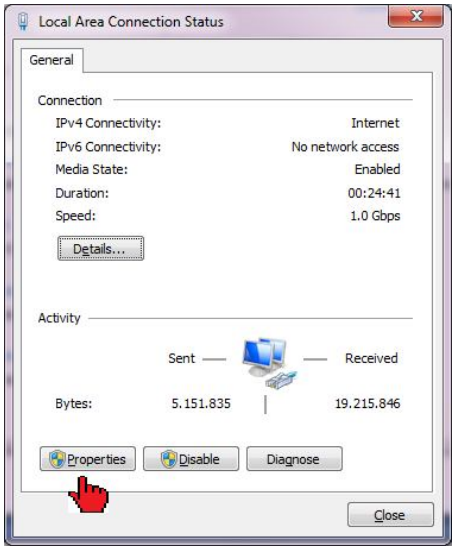


Figure 16

Insert administrative username and password if prompted.

Select ‘Internet Protocol Version 4 (TCP/IPv4)’ and click ‘Properties’.

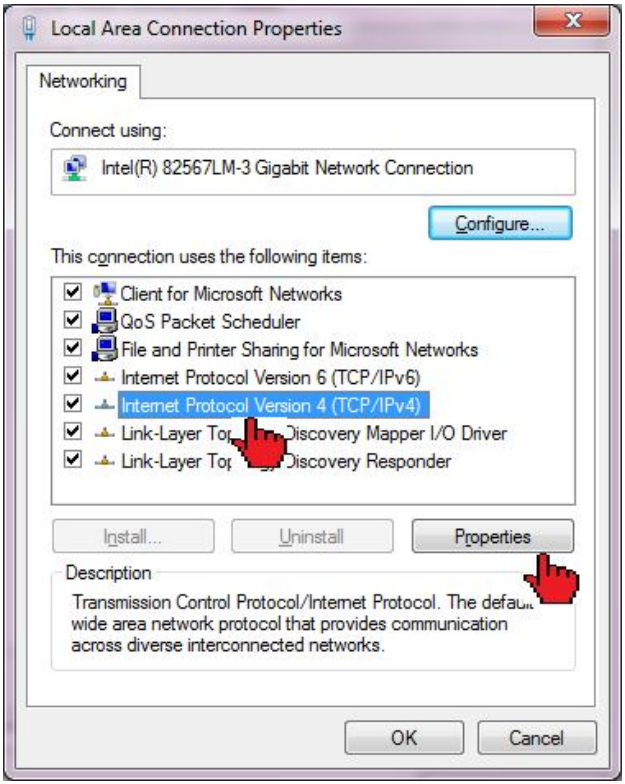


Figure 17

Fill following window using values indicated in Figure 18.

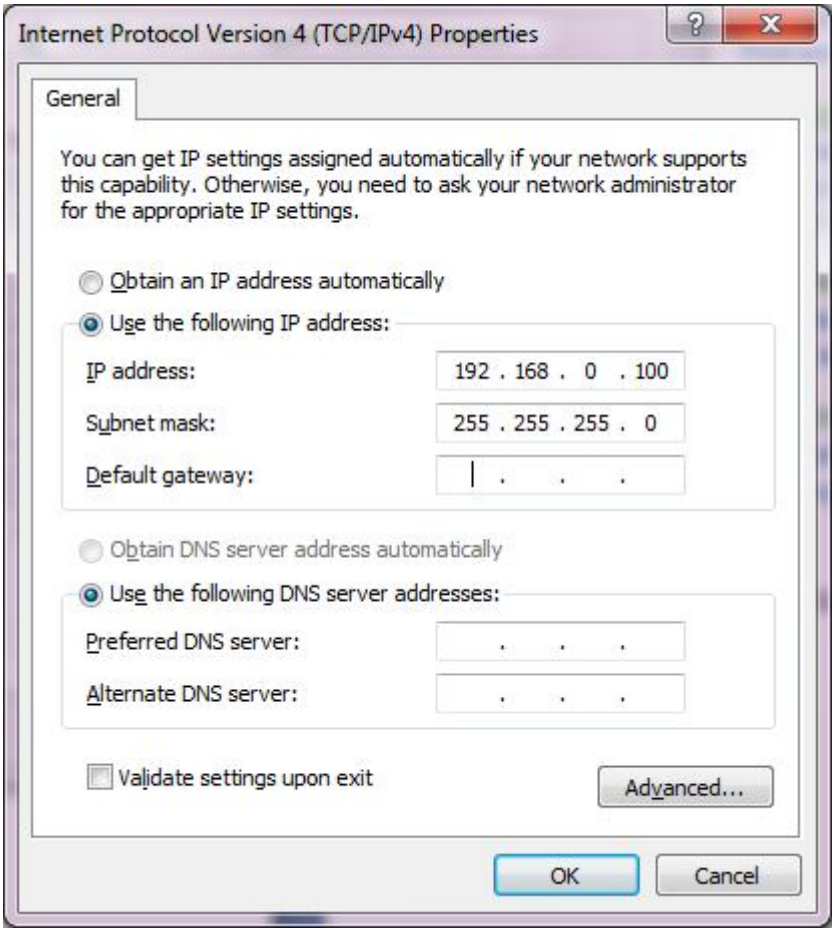


Figure 18

Click ‘OK’ to confirm and to finish with this procedure.

6. Modem connection (“or point to point connection”)

It represents the most common method where the LAN (intranet / Ethernet / internet) is not available.

It is strongly advised to use a dedicated telephone line.

IMPORTANT: Use exclusively modem devices approved by Dixell.

Remember that many modems are not compatible with Linux.

The list of compatible models can be found under the menu: ConFiguretion – System - Modem.

External Modem

Connect the External Modem to the serial Port on the back side using the modem cable commonly included into the modem packaging itself.

The modem reset is directly controlled by the XWEB3000 Server through the RS232 port by turning off and then on the modem device.

Connect the modem to the telephone line with the phone cable included into the modem packaging. Remember to check if there is a switching machine.

The connection procedure is divided in two parts. In the first part it is necessary to create the Remote Access, in your PC, set with the telephone number of the line where the XWEB3000 is connected to. You have to use Dixell as Username and Password.

The second is the procedure you will ever use: after launching the new Remote Access that will engage the line through the modem, start the Browser from your PC and insert the address **http://192.168.1.200** into Explorer/Netscape address bar.

SETTING UP DIAL-UP CONNECTION FOR WINDOWS XP

In Windows XP, you will use the "New Connection Wizard".

1. From the Start menu, select Control Panel.

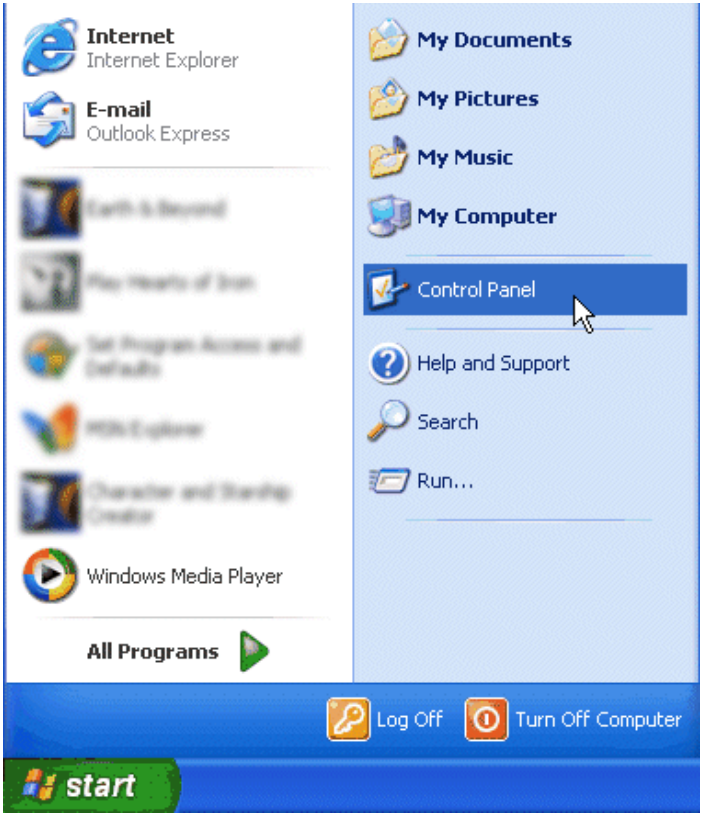


Figure 19

2. If Control Panel is set for "Classic View", double-click on the Network Connections icon.

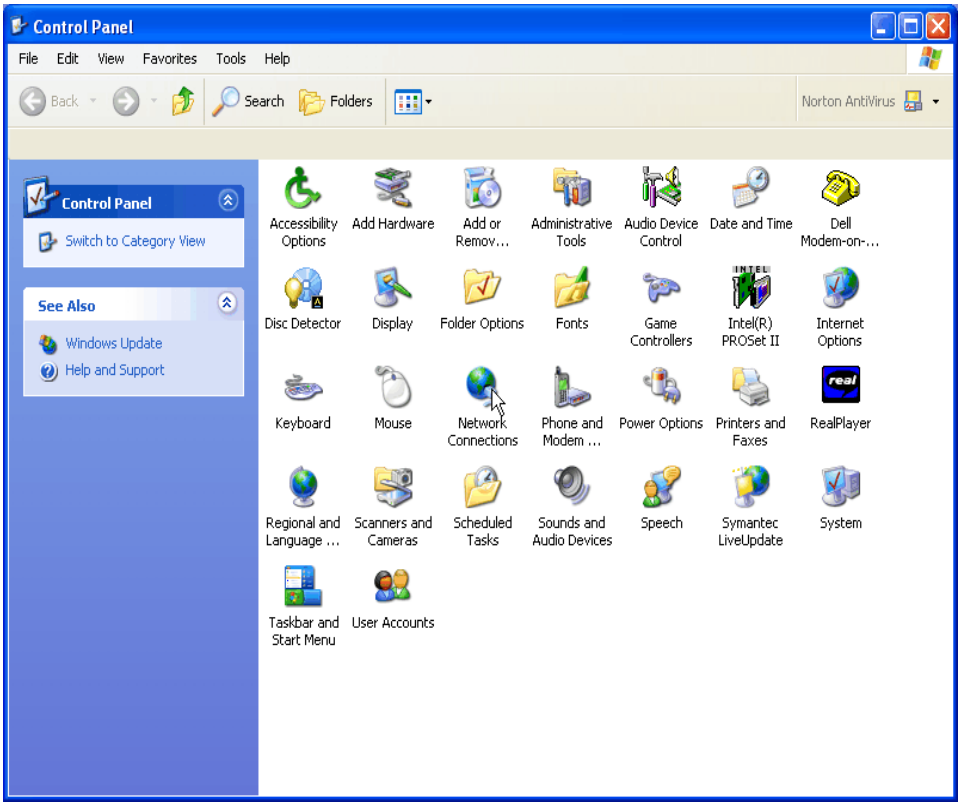


Figure 20

3. If Control Panel is set for "Category View", select the "Network and Internet Connections" category, then double-click on the Network Connections icon.

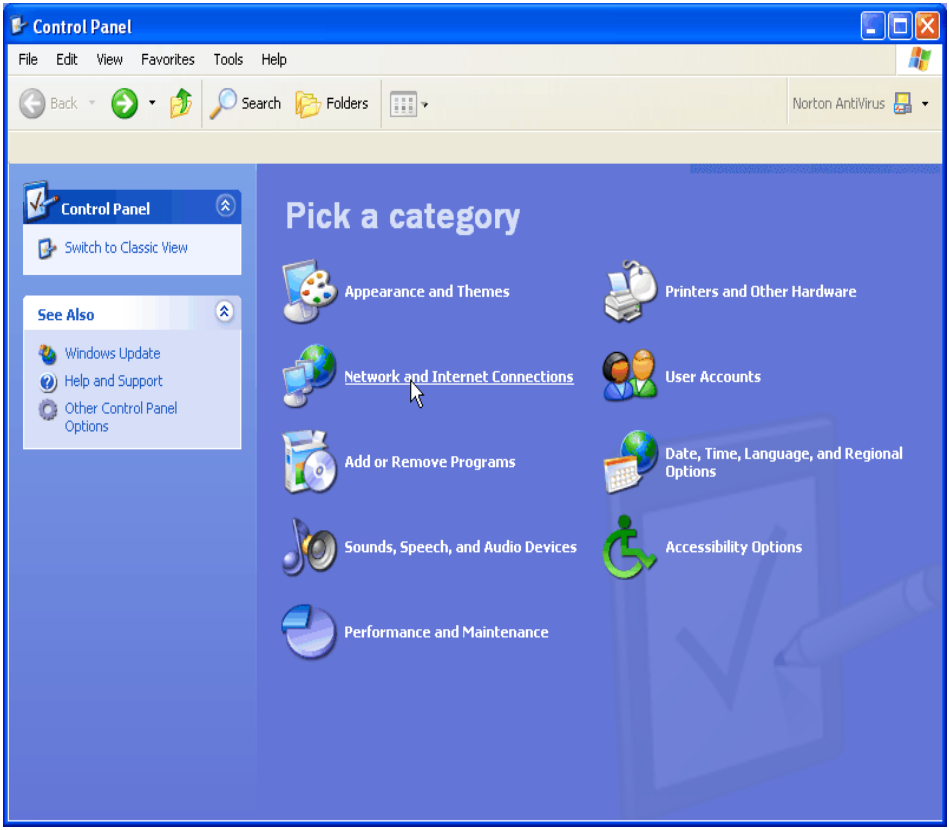


Figure 21

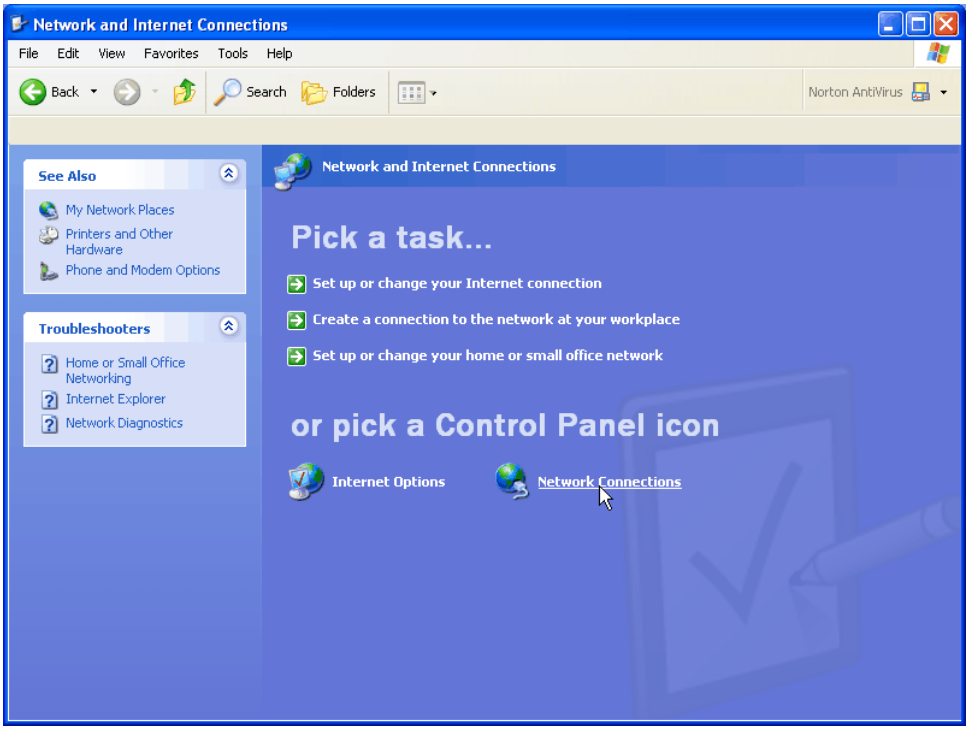

Network and Internet Connections
File Edit View Favorites Tools Help
Back Search Folders
Norton AntiVirus
See Also
My Network Places
Printers and Other Hardware
Phone and Modem Options
Troubleshooters
Home or Small Office Networking
Internet Explorer
Network Diagnostics
Network and Internet Connections
Pick a task...
Set up or change your Internet connection
Create a connection to the network at your workplace
Set up or change your home or small office network
or pick a Control Panel icon
Internet Options
Network Connections

Figure 22

4. Under Network Tasks, select "Create a new connection".

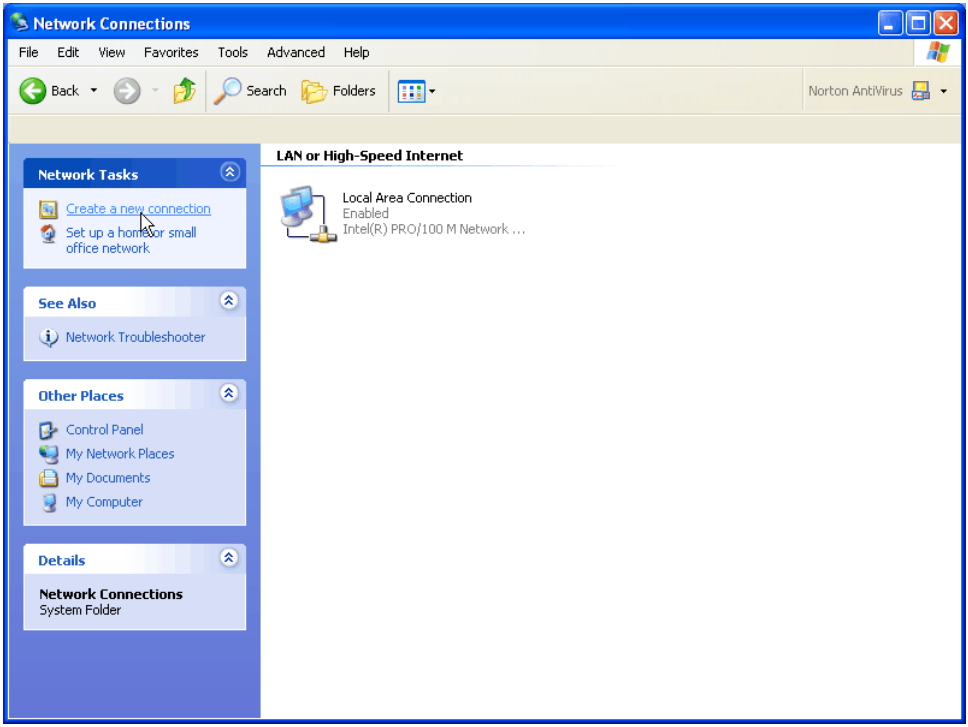


Figure 23

5. Click "Next".

Figure 24

6. Click "Next" at the bottom of this page to continue with the setup instructions.

7. Select "Connect to the Internet" and click "Next".

Figure 25

8. Select "Set up my connection manually" and click "Next".

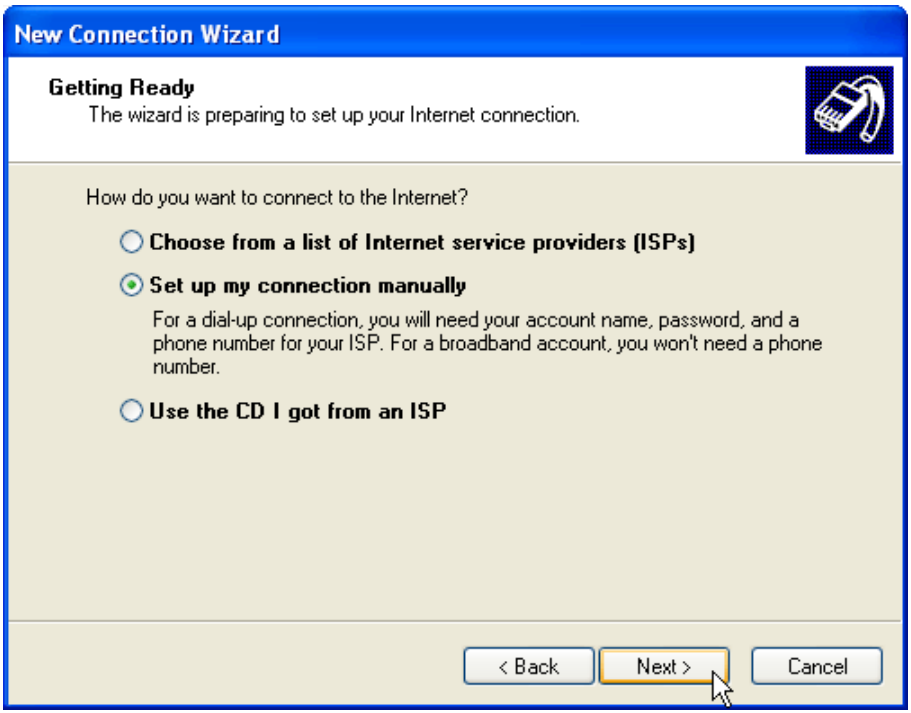


Figure 26

9. Select "Connect using a dialup modem" and click "Next".

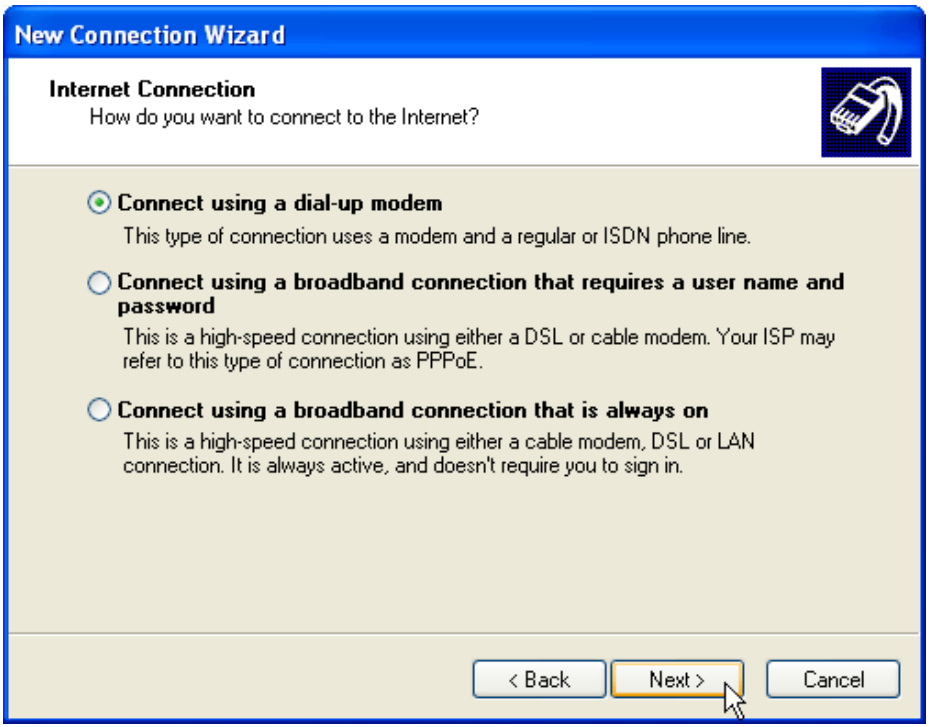


Figure 27

10. Type "XWEB3000 DIRECT MODEM" in the ISP Name box and click "Next".

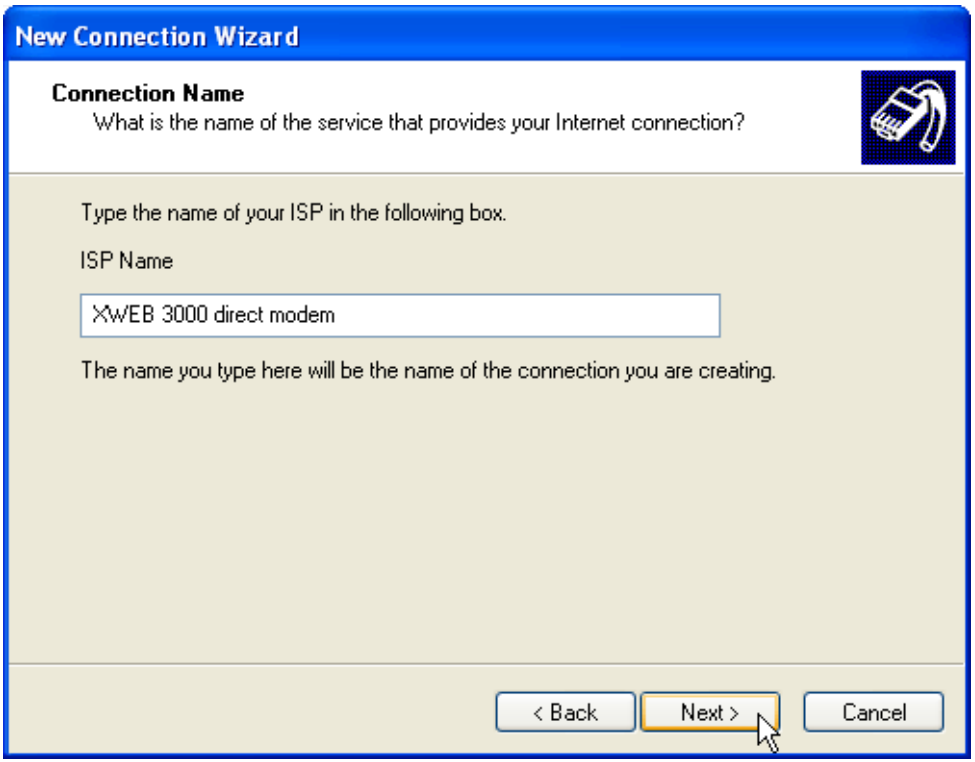


Figure 28

11. Type the access number in the Phone Number box. E.G: If telephone number is 555789 and area code is 099, put this Telephone number: 099555789.

If there is a switching machine and you have to dial a digit to get the line (0 or 9 for example, it depends on the switching machine), put this telephone number: 0, 099555789 or 9, 099555789. Click "Next".

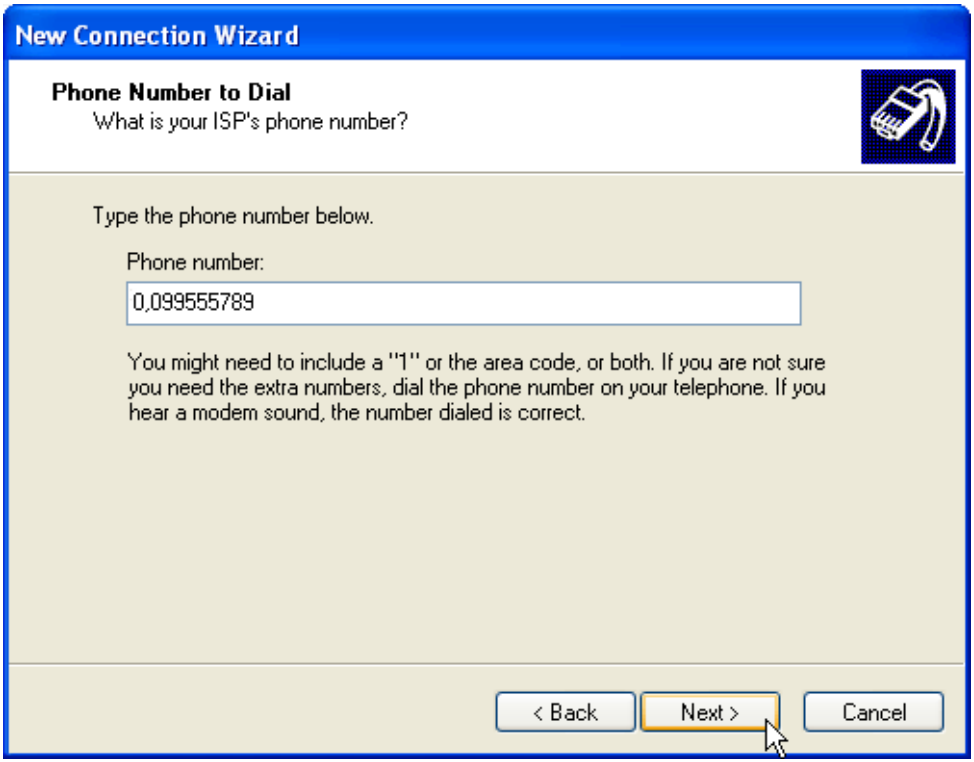


Figure 29

12. Type dialup account name dixell in the User Name box. Type dialup password dixell in the Password and Confirm Password boxes. We recommend that you check the first 2 checkboxes, but not the 3rd box which turns on the Internet Connection Firewall. Click "Next".

Figure 30

13. Place a tick in the box to create a shortcut on your desktop, and click "Finish".

Figure 31

14. You are now ready to connect to your XWEB3000. If you want to dial your XWEB3000 DIRECT MODEM connection automatically when you start Internet Explorer, do the following. Start Internet Explorer, and select "Internet Options" from the "Tools" menu. Select the "Connections" tab. Make sure that XWEB3000 DIRECT MODEM is your default connection (if not, highlight it and click "Make Default"). Make sure that the "Always dial my default connection" option is selected.

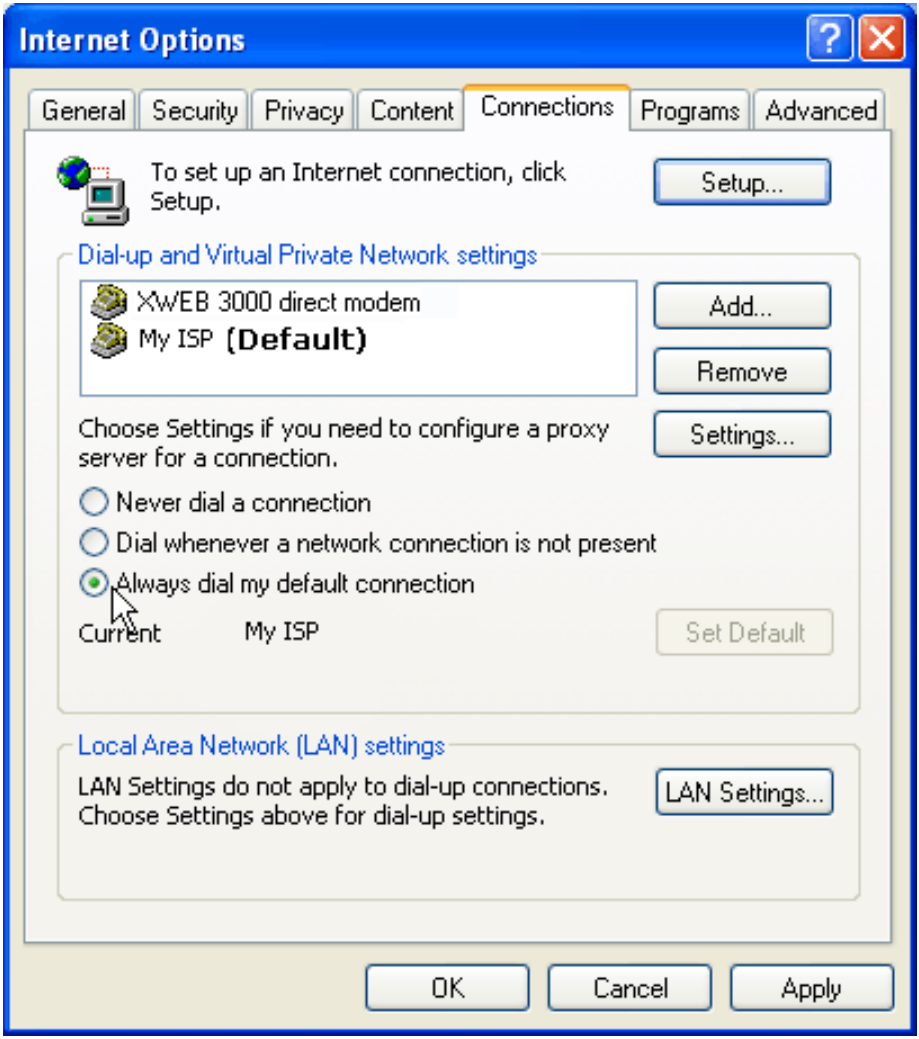


Figure 32

SETTING UP DIAL-UP CONNECTION FOR WINDOWS 7

Following procedure is illustrated with Windows7 standard visualization mode. If your system works with a different visualization mode and you have difficulties to follow following instructions then ask for support to an expert operator. Despite the visualization mode the procedure is however the same.

All the following instructions are to be executed with the usage of the left-mouse button only (where red hand icon indicates).

The system may prompt for administrative user-name and password. Please check them before starting the procedure.

Open ‘Control Panel’ as indicated in following picure.

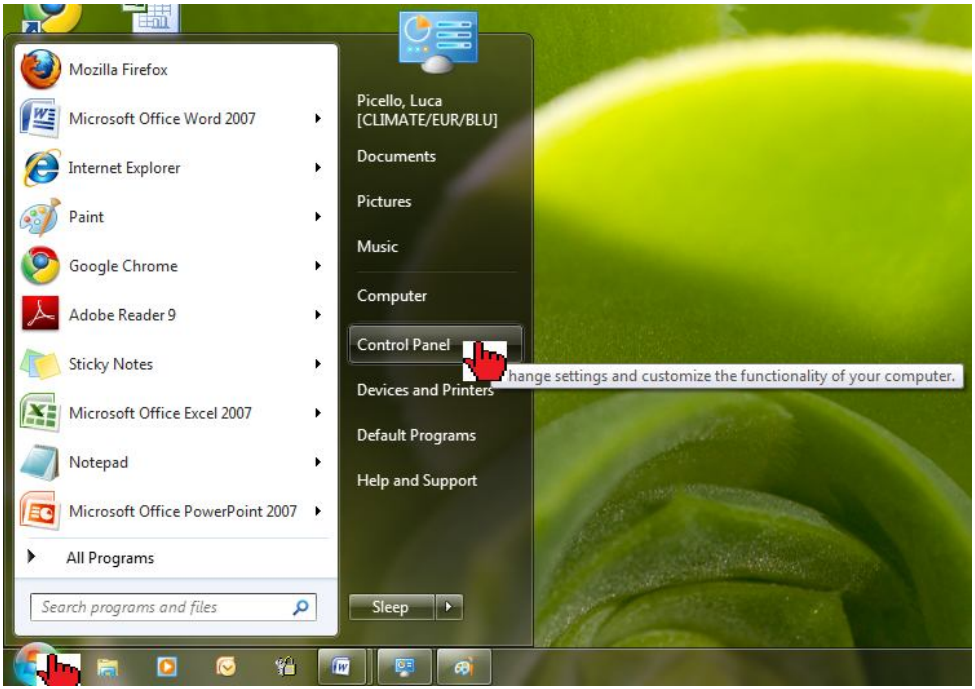
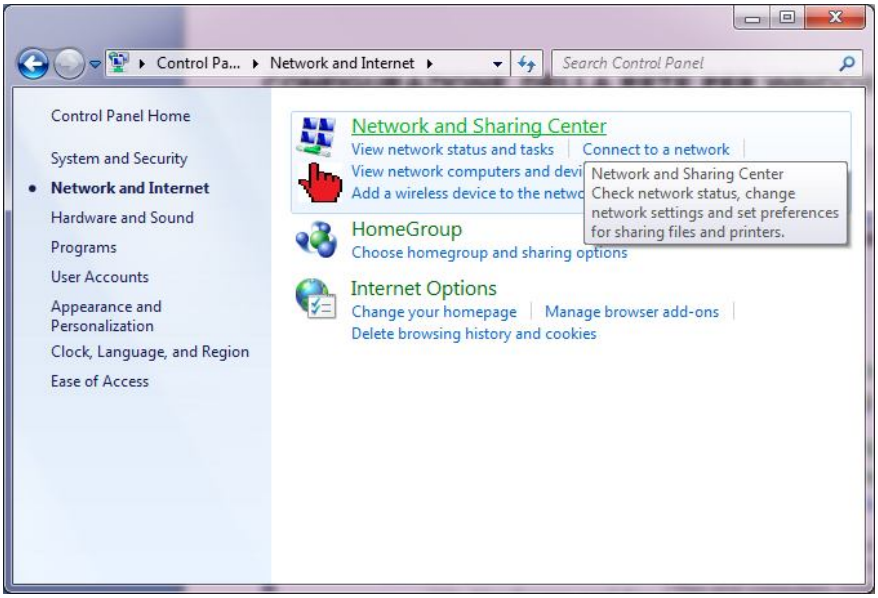


Figure 33

Open ‘Network and Internet’

Figure 34

Open ‘Network and Sharing Center’



Open ‘Set up a new connection or network:

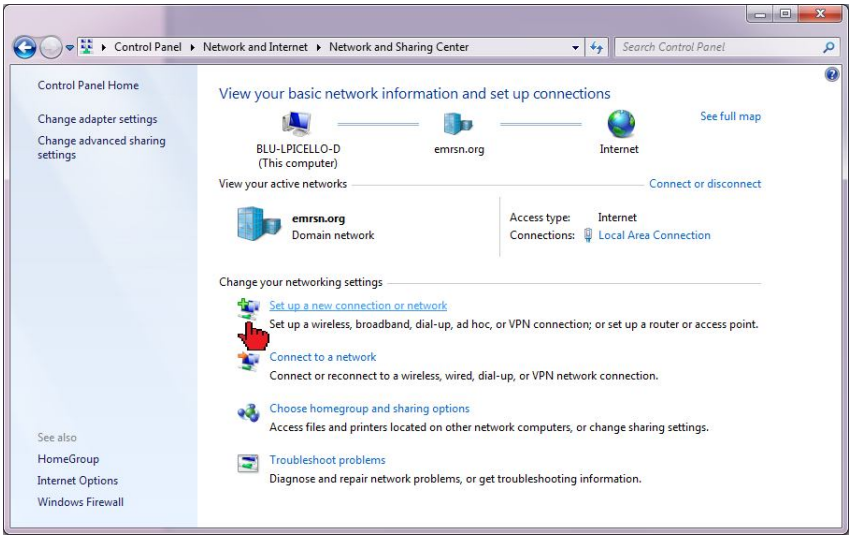


Figure 35

Open ‘Set up a dial-up connection’

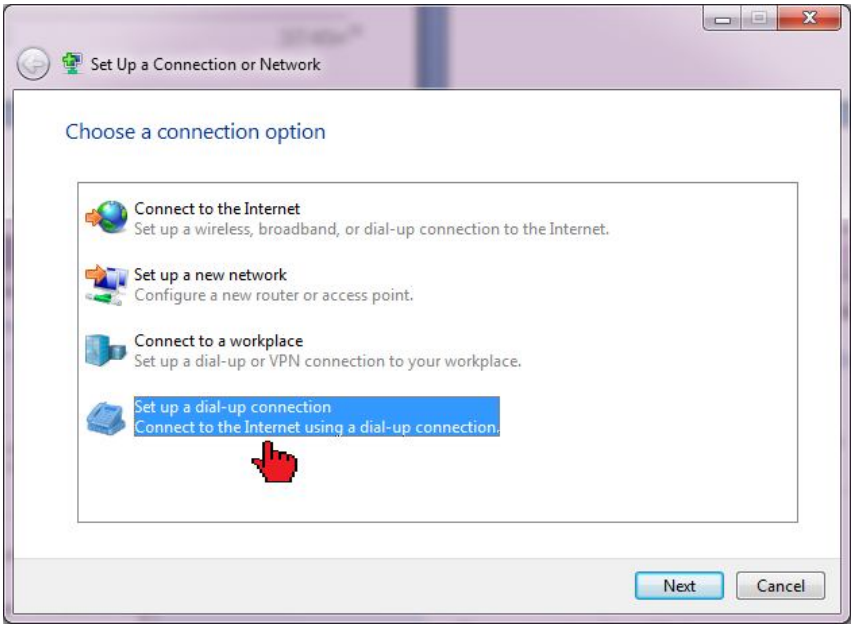


Figure 36

In case the modem is not yet attached to XWEB, choose option to run unconditioned conFiguretion.

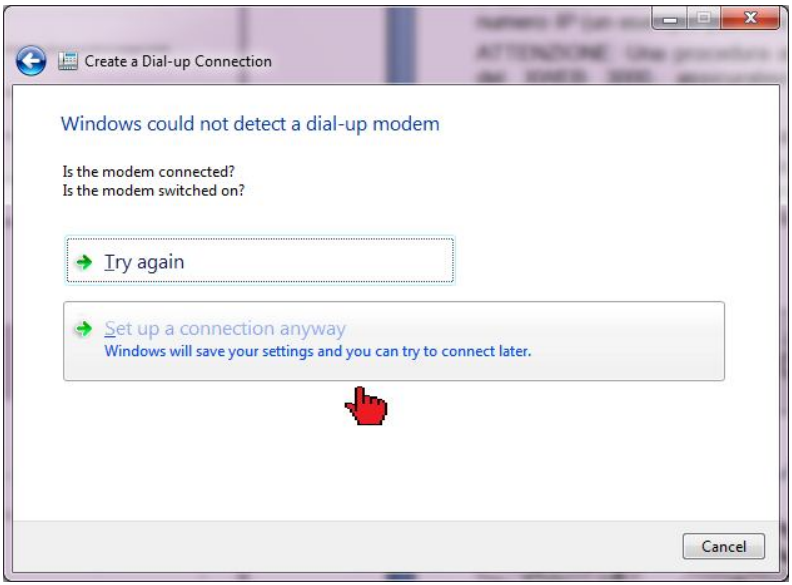


Figure 37

Type access number. E.G: If telephone number is 555789 and area code is 099, put this Telephone number: 099555789. If there is a switching machine and you have to dial a digit to get the line (0 or 9 for example, it depends on the switching machine), put this telephone number: 0, 099555789 or 9, 099555789. Insert also appropriate username and password and name the connection to reuse it avoiding to configuring it again in the future.

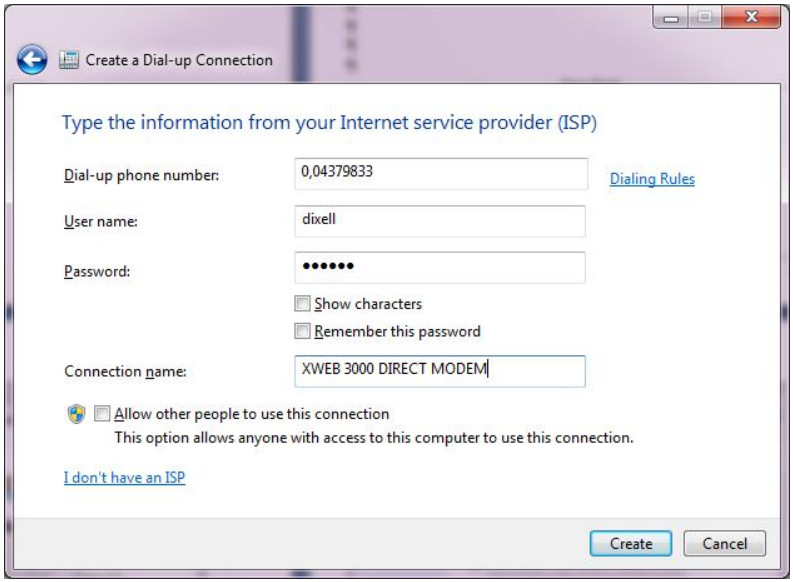


Figure 38

7. Intranet / ethernet connection

The Intranet or Ethernet connection should be initially managed by the net administrator which will assign one free IP address to reach the Server. This number is an example of what you should expect:

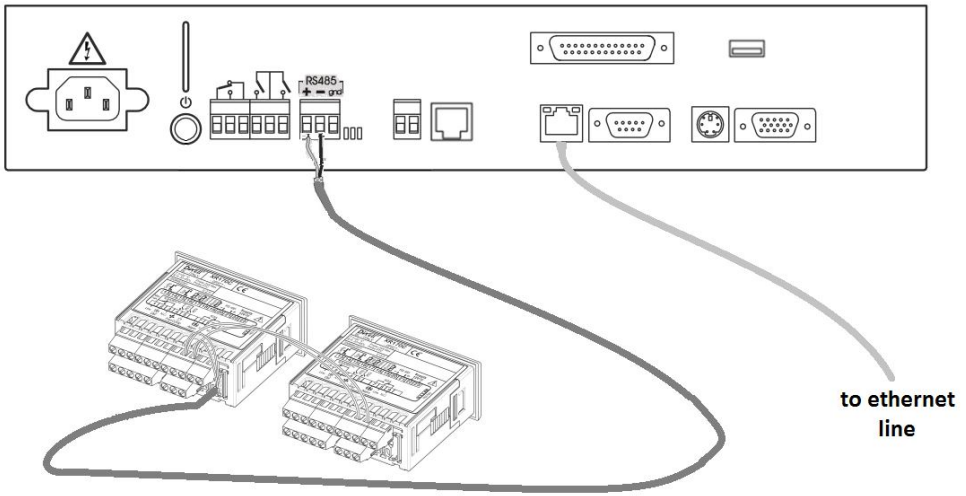
http://192.168.000.111 .

After receiving the address from your network Administrator the XWEB3000 must be set with this number.

REMEMBER: A setup wizard will guide you through the procedure. Please ensure you have an IP address to use in network section.

Use a standard RJ45 network cable to connect the unit to your lan.

The Intranet method allows the connection to interact with XWEB3000 from all the PC Clients. Insert the net address assigned by the administrator into the Browser address bar. Bookmark the address with personalised name for the future connections.



Internet connection

It is necessary to have a STATIC IP address for the XWEB3000 which is normally assigned by the Provider of your internet services (ISP).

The Internet connection allows XWEB3000 to be reached from all PC-clients. Insert the net address assigned by the administrator into the Browser address bar. Bookmark the address with personalised name for the future connections.

Ask your provider for more details about the rent of a the static IP.

This the internet system requirements for the best result:

Wide band connection.

At least 1 static IP addresses for the XWEB3000.

The internet connection is established through a device called Router that receives and sends the data as interface between an Intranet and Internet. The Provider also assigns the address of the router that is called IP WAN.

Remember that the default value of the IP of the XWEB3000 is: **192.168.0.200**.

Depending on the contract the Provider can also supply the router, otherwise the user can buy it separately.

ALWAYS: ask qualified personnel for the router installation by using this information.

Used ports that are mapped to the LAN side:

80 (used for the HTTP access)

22 (used for SSH connection)

443 (used for SSL protected connection)

10000 (used for the internal modules of the system)

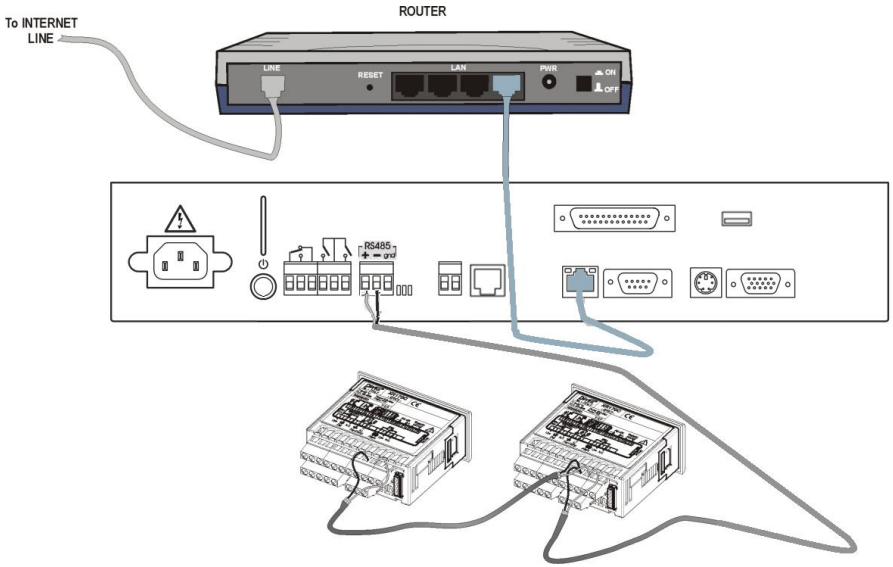
The above ports are all related to the XWEB3000 IP address 192.168.0.200.

While the ports on the WAN side are:

Telnet (to configure the router from a remote, also via Internet).

HTTP (To access the XWEB3000).

If working with the router GATEWAY and DNS check your Internet contract details. Depending on your network topology you may need a reversing NAT on port 80. It is not enough to link port 80 on Router side to port 80 on intranet side. Some firewall or Router need also di reverse setup.



8. Troubleshooting Guide

Problem	Solution
The log-in page doesn't load	Check your browser setup.
My password doesn't allow me to log-in.	Beware to the caps-lock button an capitol letters. Is it your password correct?
My browser can't reach XWEB3000 log-in page	Check cable typology From windows go to Start->Run… **ping 192.168.0.200 –t** A continuous set of information should be appear.
Someone in the intranet/LAN receive a warning message about an IP conflict.	XWEB3000 uses the same address of a resource already used in your intranet/LAN. Change XWEB3000 IP address.

9. Unit Setup Reminder

Please take some moments to make an hardcopy of this page, then compile it and store it near XWEB3000 unit.

HostName _____

IP Address _____

Gateway _____

DNS 1 _____

DNS 2 _____

SMTP _____

E-mail address _____

Modem type _____

Telephone number _____

Notes

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